SPASE AGU Abstract - Summer 2010 Meeting of the Americas

Virtual Observatories in Geosciences Session

Ttile: SPASE, Metadata, and the Heliophysics Virtual Observatories

Authors: James Thieman, Todd King, Aaron Roberts

## Abstract:

To provide data search and access capability in the field of Heliophysics (the study of the Sun and its effects on the Solar System, especially the Earth) a number of Virtual Observatories (VO) have been established both via direct funding from the U.S. National Aeronautics and Space Administration (NASA) and through other funding agencies in the U.S. and worldwide. At least 15 systems can be labeled as Virtual Observatories in the Heliophysics community, 9 of them funded by NASA. The problem is that different metadata and data search approaches are used by these VO's and a search for data relevant to a particular research question can involve consulting with multiple VO's – needing to learn a different approach for finding and acquiring data for each.

The Space Physics Archive Search and Extract (SPASE) project is intended to provide a common data model for Heliophysics data and therefore a common set of metadata for searches of the VO's. The SPASE Data Model has been developed through the common efforts of the Heliophysics Data and Model Consortium (HDMC) representatives over a number of years. We currently have released Version 2.1 of the Data Model. The advantages and disadvantages of the Data Model will be discussed along with the plans for the future. Recent changes requested by new members of the SPASE community indicate some of the directions for further development.

854324